

# DRAFT

DEFENSE ENVIRONMENTAL RESTORATION PROGRAM
FOR
FORMERLY USED DEFENSE SITES

ORDNANCE AND EXPLOSIVE WASTE CHEMICAL WARFARE MATERIALS

# ARCHIVES SEARCH REPORT CONCLUSIONS AND RECOMMENDATIONS

DEBLOIS AIR FORCE RANGE (DEBLOIS BOMBING RANGE)

DEBLOIS, MAINE WASHINGTON COUNTY

PROJECT No. DO1ME048301

SEPTEMBER 1995

PREPARED BY
US ARMY CORPS OF ENGINEERS
ST. LOUIS DISTRICT

# ORDNANCE AND EXPLOSIVE WASTE CHEMICAL WARFARE MATERIALS ARCHIVES SEARCH REPORT

#### CONCLUSIONS AND RECOMMENDATIONS

# DEBLOIS AIR FORCE RANGE (DEBLOIS BOMBING RANGE)

Deblois, Maine Washington County

#### PROJECT NO. DO1ME048301

#### TABLE OF CONTENTS

SECTION		PAGE
1.0	INTRODUCTION	
1.1	Authority	1-1
1.2	Subject	1-2
1.3	Purpose	1-2
1.4	Scope	1-3
2.0	Conclusions	
2.1	Summary of Conclusions	2-1
2.2	Historical Site Summary	2-1
2.3	Real Estate	2-3
2.4	Site Inspection	2-3
2.5	Confirmed Ordnance Presence	2-5
2.6	Potential Ordnance Presence	2-5
2.7	Uncontaminated Areas	2-5
2.8	Site Information Analysis	2-5
3.0	RECOMMENDATIONS	3-1

# ORDNANCE AND EXPLOSIVE WASTE CHEMICAL WARFARE MATERIALS ARCHIVES SEARCH REPORT

#### CONCLUSIONS AND RECOMMENDATIONS

## DEBLOIS AIR FORCE RANGE (DEBLOIS BOMBING RANGE)

Deblois, Maine Washington County

PROJECT NO. DO1ME048301

REPORT PLATES

Plate 1

**Site Layout** 

#### **APPENDICES**

A	Risk Assessment Code Procedure Form
В	Glossary and Acronyms
$\mathbf{c}$	Report Distribution List

#### 1.0 Introduction

#### 1.1 AUTHORITY

In 1980, Congress enacted the Comprehensive Environmental Response, Compensation and Liability Act (CERCLA) 42 USC 9601 et seq. Ordnance and explosive wastes are included in the CERCLA definition of pollutants and contaminants that require a remedial response.

In 1983, the Environmental Restoration Defense Account (ERDA) was established by Public Law 98-212. This Congressionally directed fund was to be used for environmental restoration at Department of Defense (DoD) active installations and formerly used properties. The DoD designated the Army as the sole manager for environmental restoration at closed installations and formerly used properties. The Secretary of the Army assigned this mission to the Corps of Engineers (USACE) in 1984.

The 1986 Superfund Amendments and Reauthorization Act (SARA) amended certain aspects of CERCLA, some of which directly related to OEW contamination. Chapter 160 of the SARA established the Defense Environmental Restoration Program (DERP). One of the goals specified for the DERP is "correction of environmental damage (such as detection and disposal of unexploded ordnance) which creates an imminent and substantial endangerment to the public health or welfare or to the environment".

The DERP requires that a CERCLA response action be undertaken whenever such "imminent and substantial endangerment" is found on:

- a. A facility or site that is owned by, leased to, or otherwise possessed by the United States and under the jurisdiction of the Secretary of Defense.
- b. A facility or site that was under the jurisdiction of the Secretary of Defense and owned by, leased to, or otherwise possessed by the United States at the time of actions leading to contamination.
- c. A vessel owned or operated by the Department of Defense.

The National Contingency Plan (NCP) was established by the Clean Water Act of 1972. The NCP has been revised and broadened several times since then. Its purpose is to provide the organizational structure and procedures for remedial actions to be taken in response to the presence of hazardous substances, pollutants, and contaminants at a site. Section 105 of the 1980 CERCLA states

that the NCP shall apply to all response actions taken as a result of CERCLA requirements.

The March 1990 National Oil and Hazardous Substances Pollution Contingency Plan given in 40 CFR part 300 is the latest version of the NCP. Paragraph 300.120 states that "DoD will be the removal response authority with respect to incidents involving DoD military weapons and munitions under the jurisdiction, custody, and control of DoD."

On 5 April 1990, U.S. Army Engineer Division, Huntsville (USAEDH) was designated as the USACE Mandatory Center of Expertise (MCX) and Design Center for Ordnance and Explosive Waste (OEW). As the MCX and Design Center for OEW, USAEDH is responsible for the design and successful implementation of all Department of the Army OEW remediations required by CERCLA. The USAEDH will also design and implement OEW remediation programs for other branches of the Department of Defense when requested. In cooperation with the Huntsville Division the U.S. Army Corps of Engineers, St. Louis District has been assigned the task of preparing Archives Search Reports for those Formerly Used Defense Sites (FUDS) suspected of ordnance and explosive waste (OEW) and chemical warfare materials (CWM) contamination.

#### 1.2 SUBJECT

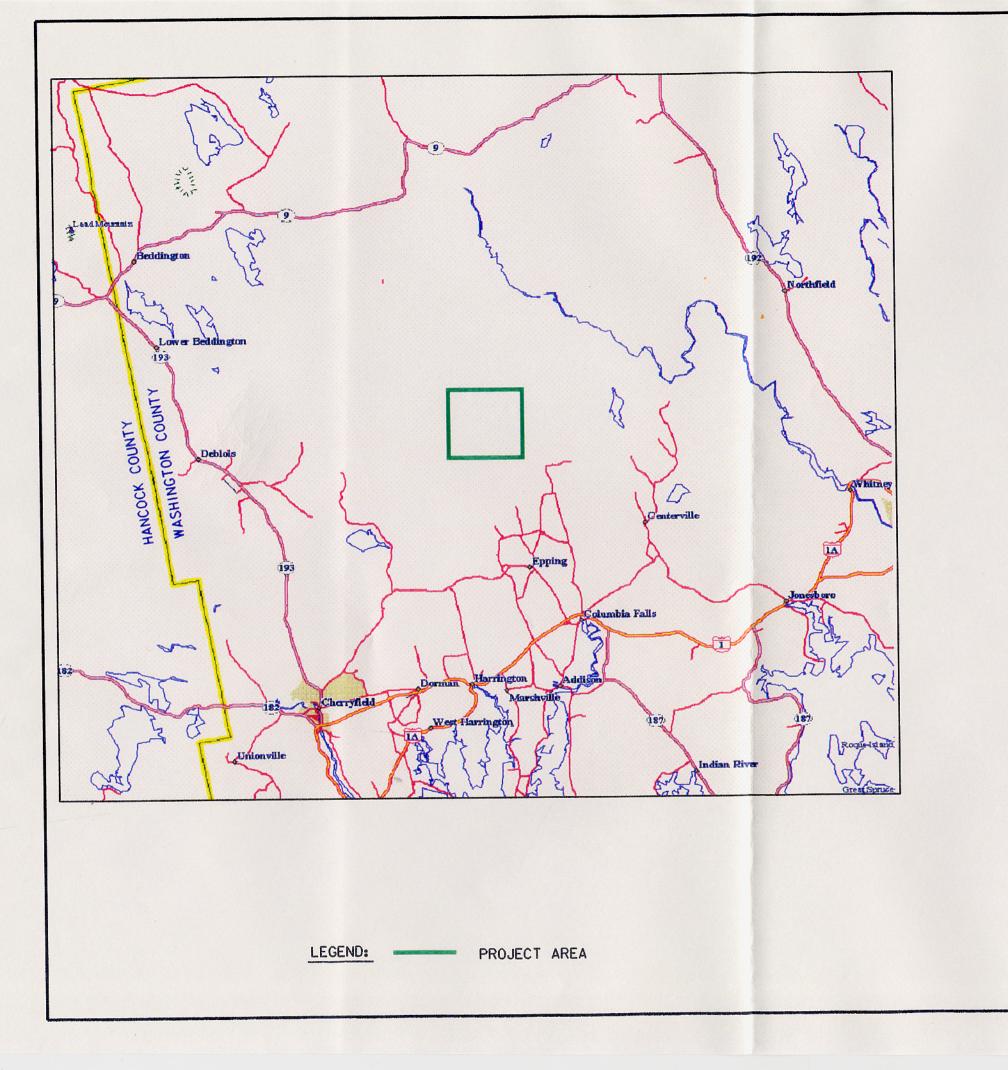
The former **Deblois Air Force Range** was located approximately three miles north of Harrington, Maine. This range was acquired by Dow Air Force Base in 1951 and was used by this base until August 1964. Historically Dow Air Force Base held jurisdiction over the bombing range, but other Strategic Air Command bases used the site. Rocketry, strafing, air-to-ground gunnery, and practice bombing are types of training conducted at the range. The site vicinity and location are shown on Figure 1-1.

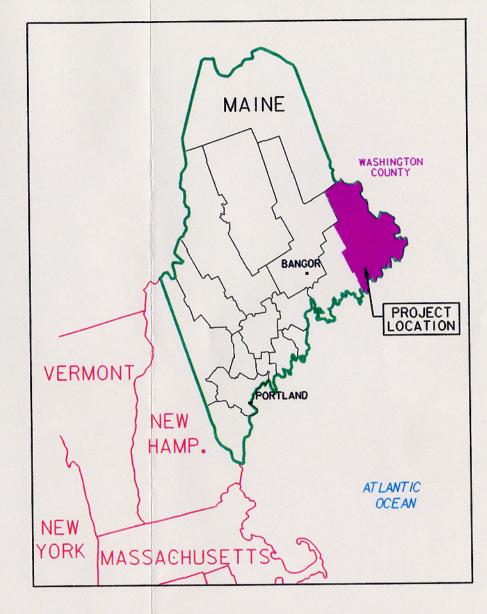
#### 1.3 PURPOSE

This Archives Search Report (ASR) compiles information obtained through historical research at various archives and records holding facilities, interviews with individuals associated with the site or its operations, and personal visits to the site. All efforts were directed towards determining possible use or disposal of conventional munitions or chemical warfare materials on the site. Particular emphasis was placed on establishing the type of munitions, the chemical agent or container, quantities of these items, and areas of disposal. Information obtained during this process was used in developing recommendations for further actions at the site.

#### 1.4 SCOPE

The entire area of the former Deblois Air Force Range, approximately 2,560 acres, was considered in assessing the potential for ordnance and explosive waste and chemical warfare material contamination.







### FIGURE 1-1

DEBLOIS AIR FORCE RANGE DEBLOIS, MAINE WASHINGTON COUNTY PROJECT # DOIMEO48301 VICINITY MAP

PROJ. DATE: SEPT 1995 DATE OF MAP: 1993
21-SEP-1995 13:57 /N/OEW95D/F2O/MAP/DEBVIC.DGN

#### 2.0 CONCLUSIONS

#### 2.1 SUMMARY OF CONCLUSIONS

#### 2.1.1 CONVENTIONAL ORDNANCE

Based on the archives search, interviews of people familiar with the area, interpretation of the aerial photography, and a personal site inspection, it appears that practice ordnance could remain at the former Deblois Air Force Range. A considerable amount of ordnance debris is present on the site. No live munitions were observed during the site inspection.

#### 2.1.2 CHEMICAL WARFARE MATERIALS

There has been no information obtained through either archival research or personal interviews indicating that chemical warfare materials were stored or used at the Deblois Air Force Range.

#### 2.2 HISTORICAL SITE SUMMARY

#### 2.2.1 Dates of Operation

During 1951 the U.S. Air Force acquired by leasehold 2,560 acres of land three miles north of Harrington, Maine, for use as a bombing range. The range associated with Dow Air Force Base was known as the Deblois Bombing and Gunnery Range and the Deblois Air Force Range.

Historically Dow Air Force Base was under the jurisdiction of the Strategic Air Command (SAC), Air Defense Command, and Tactical Air Command. Each of these commands used the Deblois Bombing and Gunnery Range.

During an inspection on 2 April 1954, the Deblois Bombing and Gunnery Range communication system was found unsatisfactory. Six improvements were recommended to bring the range up to the standard. These recommendations included relocating radio equipment to the site to provide better service and necessary maintenance, commercial power with backup diesel power should be installed, radio equipment should be made available, qualified radio maintenance personnel should be made available on site, qualified ground power mechanics should be assigned to the range, and commercial telephone lines should be installed as a primary source of communication between the base and the range. Communication upgrades began shortly thereafter.

The U.S. Air Force terminated the leasehold in August 1964, and the property reverted back to the Hearst Publishing Company.

Currently most of the property is owned by Cherryfield Foods, Incorporated, and is used for growing blueberries. The remaining acreage is used by the Columbia Falls Air Force Station.

#### 2.2.2 USE OF CHEMICAL WARFARE MATERIALS

There was no documentation obtained stating chemical warfare materials were stored or used at the Deblois Air Force Range.

#### 2.2.3 USE OF CONVENTIONAL MUNITIONS

The Deblois Air Force Range was used as a bombing and gunnery range during 1951 through 1964. Rocketry, strafing, air-to-ground gunnery, demolition bombing, OQ gunnery practice (using pilotless, radio controlled planes), and dive bombing were the types of training considered for this range. A series of correspondence from November 1951 to January 1952 discusses the need for bombing ranges by both Dow AFB and Linestone AFB. The Dow AFB needed a range suitable for practice bombing and air-to-ground use by fighter aircraft. Whereas Limestone AFB had a heavy bombardment wing that needed a range for practice and demolition bombing and gunnery against remote-controlled aircraft. The Deblois Air Force Range was considered adequate for practice use but a larger range would be necessary for the demolition bombing and OQ operations. A final resolution of the range use was not contained in the available documents.

According to a newspaper article in the *Bangor Daily News*, dated 3 June 1953, the Strategic Air Command would begin a special exercise using B-52 Stratofortress and B-47 Stratojet aircraft at the range for an indefinite period. The aircraft would fly from various SAC bases and bomb the range at approximately 5,000 feet with practice bombs containing no explosives.

Another newspaper article, dated 13-14 May 1961, stated that; F-86 Sabre Jets, F-100 Super Sabres, and the B-57 Camberra would use the Deblois Bombing Range for practice bombing, strafing, rocketry, and air-to-ground gunnery tactics.

#### 2.2.4 CERTIFICATE OF DECONTAMINATION

A certificate of decontamination was not found during the archives research.

#### 2.3 Real Estate

#### 2.3.1 DoD ownership

The United States purchased approximately 2,560 acres in leasehold from the Hearst Publishing Company, Incorporated on 31 December 1951. The site was known as Deblois Air Force Range or Deblois Bombing Range. It was used by the Air Force as a practice bombing, rocket and small arms range. The improvements built by the Air Force were: a small frame building with adjacent facilities; several concrete pads that appear to have been building foundations that may have been connected with operation of the bomb range; and several large bare earthen rings and strips that may have been bomb targets.

There is no evidence that the site was under other than DoD control during the period of the DoD lease and use.

Information from the Montegail Pond, Maine, United States Geological Survey map (Provisional Edition 1990) indicates that the U.S. Air Force is using a portion of the former bombing range for part of the Columbia Fall Air Force Station. A radar grid structure was observed on the site during the SLD site inspection.

#### 2.3.2 CURRENT OWNERSHIP

The lease was terminated on 19 August 1964 and the land returned to the Hearst Publishing Company, Incorporated. The current owner of the site is Cherryfield Foods, Incorporated, which uses the site to grow blueberries.

#### 2.4 SITE INSPECTION

#### 2.4.1 SITE INSPECTION 7 AUGUST 1995

Personnel from the U. S. Army Corps of Engineers (CE), St. Louis District (SLD), listed below traveled from St. Louis, Missouri, to Bangor, Maine, and then near Harrington, Maine, to conduct a site visit at the former Deblois Air Force Range.

Mr. Thomas Freeman, Project Manager

Mr. Hank Counts, Safety Specialist

Mr. John Pelzel, QASAS

Most of the site is currently utilized by the Cherryfield Foods, Incorporated as a blueberry farm and is managed by Mr. Ragnar Kamp, Director of Operations, 207/546-7573. The remainder of the site is used by the Columbia Falls Air Force Station for a radar station.

Mr. Kamp accompanied the site survey team on the site inspection after Mr. Counts gave the appropriate safety briefing including descriptions of possible ordnance which might be encountered. The inspection began in an area operated by the Explosive Ordnance Disposal Unit (EOD), located west of target center. High explosives were used for demolition purposes in this area. Munitions debris and other metal waste from the targets were scattered throughout the area.

Beyond the demolition area, an excavated dump site for debris found in the fields was noticed. Remains of M38A2, 100 pound practice bombs with expended M1A1 spotting charge cans, cylinders from the MK106 Mod 0 practice bombs, and several tail fuze assemblies with attached base plates were found. The tail fuzes could have been AN-M102A2, AN-M117, M125A1, or M134 all utilized with general purpose bombs. All munitions found at this dump site were expended.

Remains of M38A2 practice bombs and what was believed to be a possible fragment of a 2.75" HE warhead was found near the target center. Metallic debris which was thought to be used for holding the target in place was also found near the target center. East of the target center, a crater (approximately 4 feet in diameter and 3 feet deep) was found with the body of an expended M38A2 bomb in it. Mr. Kamp indicated that most of the debris was already accumulated in these areas when he first began work here in the mid-1980's.

Several scattered, small depressions were noted on the ground surface. These holes were generally less than one foot deep and about two feet in diameter. Mr. Kamp indicated that some of the holes had already been filled in and the fields have been leveled to make them conducive for blueberry farming. Leveling involves carefully pushing the soil and the accompanying plants from around the outside edge of the holes into the center with little or minimal digging. The blueberries are a naturally occurring plant which can require up to 50 years to become established and productive. The growers do not want to disturb the root structure of the plants. Portions of the range have undergone controlled burning with no incidents of explosions due to ordnance. Cherryfield Farms identifies this area as the Bombing Range Field.

The area which is under the jurisdiction of the Columbia Falls Air Force Station was part of the Deblois air-to-ground range. Some of the earthen target berms have been covered over by the construction of the radar structure embankment. Four berms used as target back stops located northeast of target center are still present and were investigated. No projectiles, neither casings nor bullets, were

found on or around the targets but an expended 2.25" practice rocket, assembled with a practice warhead, was found behind one of them. This area is believed to have been used for 2.75" and 2.25" rocket firing. No other ordnance was observed around the herms

Between the EOD demolition area and the target center, an expended igniter tube used in conjunction with M3 spotting charges was discovered.

Site visit photographs are presented in Appendix I of the Findings volume of the ASR.

#### 2.5 CONFIRMED ORDNANCE PRESENCE

There have been no reported discoveries of live high explosive ordnance at this site. A considerable amount of ordnance debris, made up of practice bomb casings and parts and practice rockets, exists on the former range.

#### 2.6 POTENTIAL ORDNANCE PRESENCE

There does not appear to be a significant potential for live ordnance remaining at this site.

#### 2.7 Uncontaminated Areas

A portion of the former range targets area has been covered over with an earthen embankment which supports the Air Force radar structure.

#### 2.8 SITE INFORMATIONAL ANALYSIS

Research at various archives provided information that the Deblois Air Force Range was considered for use by both Dow AFB and Limestone AFB. The range was in use from 1951 until 1964. The Dow AFB use would have included practice bombing, rocket firing, and air-to-ground gunnery by fighter aircraft. Use by Limestone AFB would have been bombardment from heavy bombers and possibly gunnery directed toward remote-controlled aircraft. Newspaper articles from 1953 and 1961 revealed that the Air Force used Deblois for practice missions with B-52 Stratofortress, B-47 Stratojet, and B-57 Camberra bombers; also the F-86 Sabre and F-100 Super Sabre fighters. The 1961 article also mentions that after those exercises the range would be used on a regular basis.

Aerial photography from 1969 shows the layout of the range, including the bomb target, strafing targets, and support buildings. The features are shown on Plate 1 of the Plate Reports section of this report. There are no indications on the photography of any large craters or severely disturbed areas.

The SLD site inspection team made positive identification of several items of the debris discovered on the range. Carcasses of the M38A2 were observed in the impact area of the target. Additional debris was found in an excavated area which was used as a dump for items removed from the fields. Other observed items of debris discovered on this site visit included: igniter tubes for the M1A1 and M3 spotting charges, expended spotting charges, a 2.25 inch practice rocket, center support tubes with fin locking web, fin lock nut and a long stem for the tail fuze, and the inner cylinders of the MK 106 MOD 0 practice bombs.

The soil at the site appears to be a matrix of a coarse rock pieces surrounded by a fine silt and clay, overlain by a thin organic layer that supports the blueberry plants. Most of the craters observed on the site were very shallow and limited in diameter to less than two feet. One larger crater (3' diameter) is still on the site with a practice M38A2 bomb casing still in it. It could not be determined if this bomb had formed this particular hole. The spotting charge was expended. The type of soil on this site appears to be resistant to deep penetration because of the resistance that would be built up in the rock.

All of the bomb debris found on the site has reportedly been on the surface. Excavations into the soil would destroy the blueberry plants would could require up to 50 years to rejuvenate. The site inspection was made at the time of peak harvest. There are no significant bare areas in the field which would indicate that the blueberry plants had been destroyed.

#### 3.0 RECOMMENDATIONS

#### 3.1 SUMMARY OF RECOMMENDATIONS

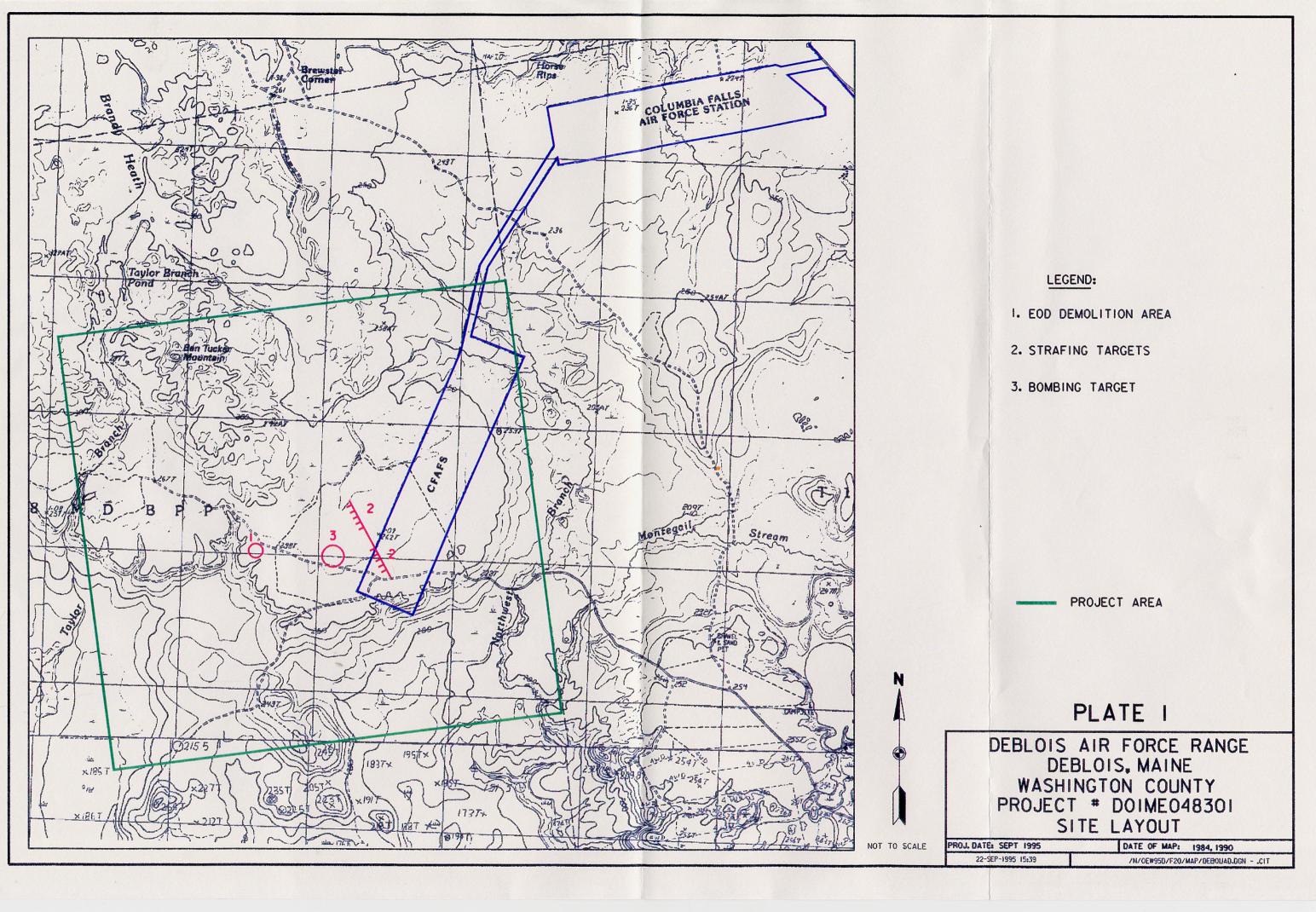
A Risk Assessment Procedures for Ordnance and Explosive Waste (OEW) Sites Form, dated 28 August 1995, has been prepared and is included in Appendix A of this report. Based on the best available data a score of <u>RAC 5</u> has been determined for the former Deblois Air Force Range. Although a considerable amount of debris from practice munitions exists on the site, the remoteness of the location reduces the risk to minimal level. Significant numbers of farm workers are generally only on the site for the 2 to 3 week harvest period.

A <u>RAC 5</u> indicates no further action by CEHND is necessary. We concur in this assessment.

#### 3.2 OTHER ACTIONS

A portion of the former range area that includes some of the gunnery and rocket targets is now a part of the Columbia Falls Air Force Station, a radar installation. Consideration should be given to having the USACE New England Division inform the appropriate United States Air Force agency of the findings of this archives search report regarding the prior use of the land.

REPORT PLATES



# APPENDIX A RISK ASSESSMENT CODE PROCEDURE FORM

### RISK ASSESSMENT PROCEDURE FOR ORDNANCE AND EXPLOSIVE WASTE (OEW) SITE

Site	Name	Deblois Air Force Range	Rater's Name	Thos. R. Freeman
Site	Location	Deblois, Maine Washington, County	Phone No.	314-331-8785
DERP	Project#	D01ME048301	Organization	CELMS-PM-M
Date	Completed	28 August 1995	RAC Score	5

#### OEW RISK ASSESSMENT:

This risk assessment procedure was developed in accordance with MIL-STD 882C and AR 385-10. The RAC score will be used by CEHND to prioritize the remedial action at Formerly Used Defense Sites. The OEW risk assessment should be based upon best available information resulting from records searches, reports of Explosive Ordnance Disposal (EOD) detachment actions, and field observations, interviews, and measurements. This information is used to assess the risk involved based upon the potential OEW hazards identified at the site. The risk assessment is composed of two factors, hazard severity and hazard probability. Personnel involved in visits to potential OEW sites should view the CEHND videotape entitled "A Life Threatening Encounter: OEW."

Part I. <u>Hazard Severity</u>. Hazard severity categories are defined to provide a qualitative measure of the worst credible mishap resulting from personnel exposure to various types and quantities of unexploded ordnance items.

### TYPE OF ORDNANCE (Circle all values that apply)

#### A. Conventional Ordnance and Ammunition VALUE Medium/Large Caliber (20mm and larger) 10 Bombs, Explosive 10 Grenades, Hand and Rifle, Explosive 10 Landmines, Explosive 10 10 Rockets, Guided Missiles, Explosive Detonators, Blasting Caps, Fuzes, Boosters, Bursters 6 Bombs, Practice (w/spotting charges) 6 Grenades, Practice (w/spotting charges) 4 Landmines, Practice (w/spotting charges) Small Arms (.22 cal - .50 cal) 1 Conventional Ordnance and Ammunition (Select the largest single value) 6 What evidence do you have regarding conventional OEW? Practice bomb and rocket debris was discovered on site.

в.	Pyrotechnics (For munitions not described above)	VALUE
	Munitions (Container) containing White Phosphorus or other Pyrophoric Material (i.e., Spontaneously Flammable)	10
	Munitions Containing A Flame or Incendiary Material (i.e., Napalm, Triethylaluminum Metal Incendiaries)	6
	Flares, Signals, Simulators, Screening Smokes (other than WP)	4
	Pyrotechnics (Select the largest single value)	_0_
	What evidence do you have regarding pyrotechnics? None	
	Bulk High Explosives (Not an integral part of conventional or ontainerized.)	dnance;
unc	On Callier Laca.	VALUE
	Primary or Initiating Explosives (Lead Styphnate, Lead Azide, Nitroglycerin, Mercury Azide, Mercury Fulminate, Tetracene, etc.)	10
	Demolition Charges	10
	Secondary Explosives (PETN, Compositions A, B, C Tetryl, TNT, RDX, HMX, HBX, Black Powder, etc.)	8
	Military Dynamite	6
	Less Sensitive Explosives (Ammonium Nitrate, Explosive D, etc.)	3
	High Explosives (Select the largest single value)	0
	What evidence do you have regarding bulk explosives?None	
D. oth	Bulk Propellants (Not an integral part of rockets, guided misser conventional ordnance; uncontainerized)	siles, or VALUE
	Solid of Liquid Propellants	6
	Propellants	0
	What evidence do you have regarding bulk propellants? None	

Chemical Warfare Materiel and Radiological Weapons	VALUE
Toxic Chemical Agents (Choking, Nerve, Blood, Blister)	25
War Gas Identification sets	20
Radiological	15
Riot Control and Miscellaneous (Vomiting, Tear)	5
Chemical and Radiological (Select the largest single value)	
What evidence do you have regarding chemical/radiological OEW	/? None

Total Hazard Severity Value

(Sum of the Largest Values for A through E--Maximum of 61)

Apply this value to Table 1 to determine Hazard Severity Category.

#### TABLE 1

#### HAZARD SEVERITY\*

Description	Category	Hazard Severity Value
CATASTROPHIC	I	21 and greater
CRITICAL	II	10 to 20
MARGINAL	TIII	5 to 9
NEGLIGIBLE	IV	1 to 4
**NONE		0

<sup>\*\*</sup>If Hazard Severity Value is 0, you do not need to complete Part II.
Proceed to Part III and use a RAC Score of 5 to determine your appropriate action.

Part II. <u>Hazard Probability</u>. The probability that a hazard has been or will be created due to the presence and other rated factors of unexploded ordnance or explosive materials on a formerly used DOD site.

### AREA, EXTENT, ACCESSIBILITY OF OEW HAZARD (Circle all values that apply)

A.	Location of OEW Hazards	VALUE		
		VALIOE		
	On the surface	5		
	Within Tanks, Pipes, Vessels or Other confined locations	4		
	Inside walls, ceilings, or other parts of Buildings and Structures	3		
	Subsurface	2		
	Location (Select the single largest value)	_5_		
	What evidence do you have regarding location of OEW? Ordnance on surface and craters with debris.	debris		
	OII SUITACE and Craters with depits.			
В.	B. Distance to nearest inhabited locations or structures likely to be at risk from OEW hazard (roads, playgrounds, and buildings).			
IIS	R IIOM OEW Mazard (Idads, playgrounds, and surrange,	VALUE		
	Less than 1250 feet	5		
	1250 feet to 0.5 miles	4		
	0.5 miles to 1.0 miles	3		
	1.0 miles to 2.0 miles	2		
	Over 2 miles	1		
	Distance (Select the single largest value)	_1_		
	What are the nearest inhabited structures? Isolate farm house	es		

. Numbers of buildings within a 2 mile radius measured from	the OEW hazard
rea, not the installation boundary.	VALUE
26 and over	5
16 to 25	4
11 to 15	3
6 to 10	2
1 to 5	1
	<b>0</b>
Number of Buildings (Select the single largest value)	0
Narrative	
. Types of Buildings (within a 2 mile radius)	VALUE
Educational, Child Care, Residential, Hospitals, Hotels, Commercial, Shopping Centers	5
Industrial, Warehouse, etc.	4
Agricultural, Forestry, etc.	3
Detention, Correctional	2
No Buildings	O
Types of Buildings (Select the largest single value)	0
Describe types of buildings in the area.	

E. Accessibility to site refers to access by humans to ordnance and explosive wastes. Use the following guidance:

BARRIER	VALUE
No barrier or security system	5
Barrier is incomplete (e.g. in disrepair or does not completely surround the site). Barrier is intended to deny egress from the site, as for a barbed wire fence for grazing.	4
A barrier, (any kind of fence in good repair) but no separate means to control entry. Barrier is intended to deny access to the site.	3
Security guard, but no barrier	2
Isolated site	1
A 24-hour surveillance system (e.g., television monitoring or surveillance by guards or facility personnel) which continuously monitors and controls entry onto the facility; or An artificial or natural barrier (e.g., a fence combined with a cliff), which completely surrounds the facility; and a means to control entry, at all times, through the gates, or other entrances to the facility (e.g., an attendant, television monitors, locked entrances, or controlled roadway access to the facility).  Accessibility (Select the single largest value)  Describe the site accessibility.	_1_
F. Site Dynamics - This deals with site conditions that are change in the future, but may be stable at the present. Exam excessive soil erosion by beaches or streams, increasing land that could reduce distances from the site to inhabited areas increase accessibility.	ples would be development
Expected	5
None Anticipated	O
Site Dynamics (Select largest value)	_ 0
Describe the site dynamics.	

Total Hazard Probability Value

(Sum of Largest Values for A through F--Maximum of 30)

Apply this value to Hazard Probability Table 2 to determine Hazard Probability Level.

\_7\_

#### TABLE 2

#### HAZARD PROBABILITY

Description Value	Level	Hazard Probablitiy					
FREQUENT	A	27 or greater					
PROBABLE	В	21 to 26					
OCCASIONAL	С	15 to 20					
REMOTE	D	8 to 14					
IMPROBABLE E less than 8							
* Apply Hazard Probability Level to Table 3.							

Part III. Risk Assessment. The risk assessment value for this site is determined using the following Table 3. Enter with the results of the hazard probability and hazard severity values.

#### TABLE 3

Probability Level		FREQUENT A	PROBABLE B	OCCASIONAL C	REMOTE D	IMPROBABLE E
Severity Category:						
CATASTROPHIC	I	1	1	2	3	4
CRITICAL	II	1	2	3	4	5
MARGINAL	III	2	3	4	4	5
NEGLIGIBLE	IV	3	4	4	5	5
			_	<b>_</b>		

#### RISK ASSESSMENT CODE (RAC)

- RAC 1 Expedite INPR, recommending further action by CEHND Immediately call CEHND-ED-SY--commercial (205) 955-4968 or DSN 645-4968.
- RAC 2 High priority on completion of INPR Recommend further action by CEHND.
- RAC 3 Complete INPR Recommend further action by CEHND.
- RAC 4 Complete INPR Recommend further action by CEHND.
- RAC 5 Usually indiactes that no further action (NOFA) is necessary.

  Submit NOFA and RAC to CEHND.

Part IV. Narrative. Summarize the documented evidence that supports this risk assessment. If no documented evidence was available, explain all the assumptions that you made.

See At	tached ASR			 
			<u> </u>	 
		<u> </u>		 

# APPENDIX B GLOSSARY AND ACRONYMS

# ORDNANCE AND EXPLOSIVE WASTE CHEMICAL WARFARE MATERIALS ARCHIVES SEARCH REPORT

#### CONCLUSIONS AND RECOMMENDATIONS

### DEBLOIS AIR FORCE RANGE (DEBLOIS BOMBING RANGE)

Deblois, Maine Washington County

#### PROJECT NO. DO1ME048301

#### APPENDIX B

#### GLOSSARY AND ACRONYMS

AAF Army Air Field AA Anti-Aircraft

AEC Army Environmental Center AGO Adjutant General's Office

AP Armor Piercing

APDS Armor Piercing Discarding Sabot

APERS Antipersonnel

APT Armor Piercing with Tracer
ASR Archives Search Report

Aux Auxiliary

BAR Browning Automatic Rifle

BD Base Detonating

BD/DR Building Demolition/Debris Removal

BE Base Ejection

BGR Bombing and Gunnery Range
BLM Bureau of Land Management
BRAC Base Realignment And Closure
CADD Computer-Aided Design/Drafting

Cal Caliber

CBDA Chemical and Biological Defense Agency

CBR Chemical, Biological, Radiological

CBDCOM Chemical and Biological Defense Command

CE Corps of Engineers

CEHND Corps of Engineers, Huntsville Division

# ORDNANCE AND EXPLOSIVE WASTE CHEMICAL WARFARE MATERIALS ARCHIVES SEARCH REPORT

#### CONCLUSIONS AND RECOMMENDATIONS

# DEBLOIS AIR FORCE RANGE (DEBLOIS BOMBING RANGE)

Deblois, Maine Washington County

#### PROJECT NO. DO1ME048301

Corps of Engineers, St. Louis CELMS Comprehensive Environmental Response, Compensation CERCLA and Liability Act Community Environmental Response Facilitation Act CERFA Code of Federal Regulations CFR Cubic Feet Per Second cfs Chief of Engineers COE Composition COMP Cartridge COG Chemical Surety Material CAM Command Sergeant Major CAM Chemical Warfare Material **CWM** Chemical Warfare Service **CWS** Department of the Army DA Development and Readiness Command DARCOM Defense Environmental Restoration Account DERA Defense Environmental Restoration Program DERP Defense Environmental Restoration Program-DERP-FUDS Formerly Used Defense Sites Department of Defense DoD Department of Energy DOE Department of Interior DOI Engineering Evaluation/Cost Analysis EE/CA **Environmental Impact Statement** EIS Explosives Ordnance Disposal EOD Environmental Protection Agency EPA **Environmental Restoration Defense Account** ERDA Findings and Determination of Eligibility FDE Federal Farm Mortgage Corporation FFMC

#### ORDNANCE AND EXPLOSIVE WASTE CHEMICAL WARFARE MATERIALS ARCHIVES SEARCH REPORT

#### CONCLUSIONS AND RECOMMENDATIONS

# DEBLOIS AIR FORCE RANGE (DEBLOIS BOMBING RANGE)

Deblois, Maine Washington County

#### PROJECT NO. DO1ME048301

FLCH Flechette

FS Feasibility Study

FUDS Formerly Used Defense Sites
GIS Graphic Information System
GPS Global Positioning System

GSA General Services Administration

HE High Explosive

HEAT High Explosive Anti-Tank
HEI High Explosive Incendiary

HEP Plastic

HE-S Illuminating

HTRW Hazardous Toxic and Radioactive Waste

HTW Hazardous and Toxic Waste
IAS Initial Assessment Study
INPR Inventory Project Report

IRP Installation Restoration Program MCX Mandatory Center of Expertise

MDIFW Maine Department of Inland Fisheries and Wildlife

MG Machine Gun
MG Major General
mm Millimeter

MT Mechanical Time

MTSQ Mechanical Time Super Quick

NARA National Archives and Records Administration

NAS Naval Air Station

NCDC National Climatic Data Center NCP National Contingency Plan NFS National Forest Service

#### ORDNANCE AND EXPLOSIVE WASTE CHEMICAL WARFARE MATERIALS ARCHIVES SEARCH REPORT

#### CONCLUSIONS AND RECOMMENDATIONS

# DEBLOIS AIR FORCE RANGE (DEBLOIS BOMBING RANGE)

Deblois, Maine Washington County

#### PROJECT NO. DO1ME048301

National Guard NG National Geodetic Vertical Datum NGVD National Oceanic and Atmospheric Administration NOAA No Further Action NOFA National Personnel Records Center NPRC National Records Center NRC Ordnance and Explosive Waste OEW Occupational Safety and Health Act OSHA **Operational Training Unit** OTU Preliminary Assessment PA Point Detonating PD Point Initiating, Base Detonating **PIBD** PLPublic Law Quality Assurance Specialist Ammunition Surveillance QASAS Removal Action RA Risk Assessment Code RAC Remedial Design RDRecord Group RGRemedial Investigation RIRemedial Investigation/Feasibility Study RI/FS Replacemednt Training Unit RTU Superfund Amendments and Reauthorization Act SARA South Carolina Department of Natural Resources SCNDR Soil Conservation Service SCS St. Louis District, Corps of Engineers SLD Site Safety and Health Officer SSHO Site Specific Safety and Health Plan SSHP Solid Waste Management Units SWMU

#### ORDNANCE AND EXPLOSIVE WASTE CHEMICAL WARFARE MATERIALS ARCHIVES SEARCH REPORT

#### CONCLUSIONS AND RECOMMENDATIONS

### DEBLOIS AIR FORCE RANGE (DEBLOIS BOMBING RANGE)

Deblois, Maine Washington County

#### PROJECT NO. DO1ME048301

**Test Evaluation Command** TECOM TEU Technical Escort Unit Trinitrotoluene TNTTP **Target Practice** United States of America USA **USACE** U.S. Army Corps of Engineers U.S. Army Defense Ammunition Center and School USADACS U.S. Army Engineer District USAED USAEDH U.S. Army Engineer Division, Huntsville, Alabama **USATHMA** U.S. Army, Corps of Engineers, Toxic and Hazardous **Materials Agency** USC United States Code U.S. Department of Army **USDA USFWS** U.S. Fish and Wildlife Service USGS U.S. Geological Survey UXO Unexploded Ordnance WAA War Assets Administration

Washington National Records Center

War Department

WD WNRC

# APPENDIX C REPORT DISTRIBUTION LIST

# ORDNANCE AND EXPLOSIVE WASTE CHEMICAL WARFARE MATERIALS ARCHIVES SEARCH REPORT

#### CONCLUSIONS AND RECOMMENDATIONS

# DEBLOIS AIR FORCE RANGE (DEBLOIS BOMBING RANGE)

Deblois, Maine Washington County

#### PROJECT NO. DO1ME048301

## APPENDIX C REPORT DISTRIBUTION LIST

Addressee	No. Copies
ommander, U.S. Army Engineer Division, Huntsville ATTN: CEHND-ED-SY-A P.O. Box 1600 Huntsville, Alabama 35807-4301	2
Commander, U.S. Army Engineer Division, New England ATTN: CENED-PL Frederick C. Murphy Federal Building	1
424 Trapelo Road	
Waltham, Massachusetts 02254-9149	
Commander, U.S. Army Chemical Material Destruction Agency ATTN: SFIL-NSM, Bldg. E4585	1
Aberdeen Proving Ground, Maryland 21010	
Commander, U.S. Army Chemical and Biological Defense Command ATTN: AMSCB-CIH, Bldg. E5183	1
Aberdeen Proving Ground, Maryland 21010-5423	
U.S. Army Technical Center for Explosives Safety ATTN: SMCAC-ESM Savanna, Illinois 61074-9639	1
	1
CELMS-PD -PM-M	1 1